The 2000 Supermarket Panel
Executive Summary Report

The Retail Food Industry Center established the Supermarket Panel in 1998 as the basis for ongoing study of the supermarket industry. The Panel is unique because the unit of analysis is the individual store and the same stores are tracked over time. Individual stores provide information annually on store characteristics, operations, and performance. This makes it possible to trace the impacts of new technologies and business practices as they are adopted. The Panel has two overall objectives:

1. Provide timely, useful information for our industry through benchmark reports and annual summaries.
2. Be a ready source of longitudinal, cross-section data for research on current and emerging issues.

The 2000 Panel consists of 344 stores selected at random from the nearly 32,000 supermarkets in the U.S. The Panel is a representative cross-section of the industry. Characteristics of stores in the 2000 Panel are generally quite similar to figures presented in the 67th Annual Report of the Grocery Industry published by Progressive Grocer in April 2000.

In June 2000 each store in the panel received a confidential benchmark report comparing it to peer stores similar in format and size. Index scores for six key management areas – supply chain practices, human resource practices, food handling, environmental practices, quality assurance, and service offering – were an important feature of this report. They make it easier for stores to assess relative strengths and weaknesses and identify areas for increased management attention.

Key findings from the 2000 Supermarket Panel include:

- *Median annual sales growth is remarkably high for stores in ownership groups of 31 - 60 stores, 3.6% relative to growth rates less than 2% for the other group sizes. (Table 2.2)*
- *Warehouse stores have high labor productivity and sales per square foot, but their median sales growth rate is negative. (Tables 2.3 and 9.2)*
- *Stores that place increased emphasis on supply chain and human resource practices have more efficient management of space, labor, and inventories. (Tables 3.5 and 9.2)*

- *After controlling for other factors, group size has little impact on performance. This suggests wholesaler supplied stores can be competitive. However, stores in self-distributing groups have higher inventory turns. (Table 9.2)*

- *Stores that have implemented Internet ordering have much higher median annual sales growth than stores that do not offer this service – 4.4% versus 1.7% . (Table 10.3)*

- *Stores that face supercenter competition have a median annual sales growth rate of only 0.7%, compared to a rate of 2.1% for other stores. (Table 10.4)*

<u>Supermarket Panel 2001</u>

Work on the 2001 Panel is already underway. In addition to the 344 stores in the 2000 Panel, 1,600 new randomly selected stores will be asked to participate. Our objective is to continue expanding the size of the Panel. This will increase the accuracy of our industry profile and make it possible to examine emerging trends in greater detail.

With a second year of data from a randomly selected panel of stores, we will be able to take full advantage of the unique capabilities the Panel offers for longitudinal analysis. We will place particular emphasis on the following questions.

- What are the characteristics of stores that are leaders across the entire range of performance measures?

- What are the key determinants of labor productivity?

- How are food system-wide supply chain initiatives being reflected in investment and technology adoption at the store level?

Table 2.2. Descriptive Profile of the Panel for Stores Grouped by Store Group Size

	Single Store	2 -10 Stores	11 - 30 Stores	31 - 60 Stores	> 60 Stores
Number of Stores	58	83	52	26	125
Median Selling Area (sq. ft.)	13,500	23,000	28,500	28,500	36,996
Median Store Age	32	23	24	20	13
Median Number of Stores in Store Group	1	4	19	44	517
Percent Wholesaler Supplied	97	94	73	54	6
Percent Located in an SMSA	41	52	67	61	71
Median Performance Measures					
• **Weekly Sales**	$81,000	$144,000	$236,050	$180,357	$295,781
• **Weekly Sales per Square Foot**	$6.05	$6.64	$7.66	$6.39	$8.06
• **Sales per Labor Hour**	$83.33	$98.61	$103.93	$107.26	$113.59
• **Sales per Transaction**	$13.14	$16.72	$19.70	$18.66	$21.48
• **Annual Inventory Turns**	19.0	16.2	15.8	15.0	20.7
• **Percent Employee Turnover**	40.9	47.6	37.5	35.6	42.0
• **Gross Profit as a Percent of Sales**	22.2	23.0	22.8	22.2	24.8
• **Payroll as a Percent of Sales**	10.0	9.5	9.4	9.5	9.8
• **Annual Percentage Sales Growth**	1.4	1.6	1.9	3.6	1.8
Distribution by Format					
• **Conventional**	41	53	24	19	29
• **Superstore/Upscale**	2	9	9	1	29
• **Food/Drug Combination**	1	1	4	1	31
• **Warehouse**	0	6	6	2	5
• **Other**	5	3	2	1	10
Distribution by Region					
• **Northeast**	11	11	5	3	28

• **Midwest**	24	34	24	7	24
• **South**	13	22	10	9	45
• **West**	10	16	13	7	28

Table 2.3. Descriptive Profile of the Panel for Stores Grouped by Format

	CON	SS/US	FD COMBO	WH	OTHER
Number of Stores	166	50	38	19	21
Median Selling Area (sq. ft.)	20,000	38,000	40,000	52,500	29,000
Median Store Age	25	10	12	13	24
Median Number of Stores in Store Group	6	98	231	14	33
Percent Wholesaler Supplied	73	40	18	53	48
Percent Located in an SMSA	51	80	68	68	86
Median Performance Mesaures					
• **Weekly Sales**	$127,000	$345,000	$315,000	$465,000	$105,000
• **Weekly Sales per Square Foot**	$6.61	$8.33	$8.46	$9.04	$7.17
• **Sales per Labor Hour**	$96.92	$106.25	$122.3	$131.02	$127.5
• **Sales per Transaction**	$16.77	$25.00	$23.73	$26.46	$19.67
• **Annual Inventory Turns**	16.0	20.4	18.7	15.9	20.0
• **Percent Employee Turnover**	45.2	40.7	44.3	41.6	54.4
• **Gross profit as a Percent of Sales**	23.0	25.0	23.5	19.25	19.0
• **Payroll as a Percent of Sales**	10.0	9.6	10.0	7.4	9.4
• **Annual Percentage Sales Growth**	2.0	3.0	2.7	(0.3)	0
Distribution by Store Group Size					
• **Single Store**	41	2	1	0	5
• **2 - 10 Stores**	53	9	1	6	3
• **11 - 30 Stores**	24	9	4	6	2
• **31 - 60 Stores**	19	1	1	2	1
• **> 60 Stores**	29	29	31	5	10
Distribution by Region					
• **Northeast**	30	12	4	1	4
• **Midwest**	55	17	5	12	4
• **South**	53	10	11	3	6
• **West**	28	11	18	3	7

CON = Conventional **FD COMBO = Food/Drug Combination**
SS/US = Superstore/Upscale **WH = Warehouse**

Table 3.5. Average Characteristics and Performance Measures for Stores Grouped by Supply Chain Score

	Lowest Quartile	Second Quartile	Third Quartile	Highest Quartile
Median Supply Chain Score	19	44	64	81
• **Technology Component**	25	31	50	75
• **Decision Sharing Component**	5	60	80	100
Market Characteristics				
• **Median Population Density (per sq. mi)**	148	184	741	1174
• **Median Household Income ($/year)**	$32,682	$34,438	$39,172	$43,012
• **Percent Located in an SMSA**	49	52	63	76
Store Characteristics (Median)				
• **Store Age (years)**	13	14	11	12
• **Number of Stores in Store Group**	2	8	31	151
• **Weekly Sales ($)**	$90,000	$141,000	$215,456	$309,000
• **Selling Area (sq. ft.)**	15,000	25,000	30,000	42,000
• **Weekly Labor Hours**	1,000	1,590	2,200	2,729
Store Characteristics (Percentage)				
• **Wholesaler Supplied**	90	76	40	19
• **Union Workforce**	8	25	34	53
Performance Measures (Median)				
• **Weekly Sales per Square Foot of Selling Area**	$6.35	$6.71	$8.03	$7.80
• **Sales per Labor Hour**	$96.05	$96.17	$104.25	$114.29
• **Sales per Transaction**	$14.89	$17.33	$20.42	$22.98
• **Annual Inventory Turns**	15.9	17.2	18.0	20.0
• **Percentage Employee Turnover**	40.7	40.6	42.9	44.7
• **Gross Profit as a Percent of Sales**	22.0	23.0	22.8	24.9
• **Payroll as a Percent of Sales**	10.0	10.0	9.4	9.2
• **Annual Percentage Sales Growth**	0.9	2.6	2.3	1.8

Table 9.1. Summary Information for Explanatory Variables in Store Performance Analysis

Variable	Abbreviation	Comments
Market Characteristics		
• **Population Density**	**PopDen**	Based on Census data
• **Median Household Income**	**HHInc**	Based on Census data
• **Located in an SMSA**	**SMSA**	1 if SMSA, 0 otherwise
Store Characteristics		
• **Selling Area (sq. ft.)**	**SellSize**	
• **Superstore/Upscale**	**US**	1 if US, 0 otherwise
• **Food/Drug Combination**	**FD**	1 if FD, 0 otherwise
• **Warehouse**	**WH**	1 if WH, 0 otherwise
• **Store group Size**	**GSize**	
• **Self Distributing Group**	**SelfDist**	1 if SelfDist, 0 otherwise
• **Union Workforce**	**Union**	1 if Union, 0 otherwise
Competitive Strategy		
• **Price Leader**	**PLeader**	1 if PLeader, 0 otherwise
• **Quality leader**	**QLeader**	1 if QLeader, 0 otherwise
• **Service Leader**	**SLeader**	1 if SLeader, 0 otherwise
• **Variety leader**	**VLeader**	1 if VLeader, 0 otherwise
Management Practices		
• **Supply Chain Score**	**SCScr**	Scale from 0 to 100
• **Human Resources Score**	**HRScr**	Scale from 0 to 100
• **Food Handling Score**	**FHScr**	Scale from 0 to 100
• **Environmental Practices Score**	**EPScr**	Scale from 0 to 100
• **Quality Assurance Score**	**QAScr**	Scale from 0 to 100
• **Service Offerings Score**	**SOScr**	Scale from 0 to 100

Table 9.2 Qualitative Results for Performance Driver Regressions

Explanatory Variable	Weekly Sales per Square Foot	Sales per Labor Hour	Annual Inventory Turns	Payroll as a Percent of Sales	Annual Percentage Sales Growth
Market Characteristics					
• PopDen	++	++	- -		++
• HHInc			-		++
• SMSA	+		+	- -	
Store Characteristics					
• SellSize	- -			++	- -
• US	++				
• FD	+		- -		
• WH	++	++	- -	- -	- -
• GSize					- -
• SelfDist			++		
• Union	++	++	++		
Competitive Strategy					
• PLeader	++	+		- -	++
• QLeader			++		++
• SLeader	++				-
• VLeader					
Management Practices					
• SCScr	++			- -	
• HRScr	+		++		- -
• FHScr					
• EPScr		+	- -		
• QAScr			- -		
• SOScr				+	

Table 10.3. Store Characteristics and Performance for Stores Grouped by Use of Internet Ordering

	Internet Ordering	No Internet Ordering
Number of Stores	30	306
Store Characteristics (Median)		
• **Selling Area**	35,000	27,000
• **Group Size**	100	15
• **Median Household Income**	$39,862	$36,666
Store Performance Levels (Median)		
• **Weekly Sales per Square Foot**	$8.79	$7.06
• **Sales per Labor Hour**	$107.60	$101.85
• **Annual Inventory Turns**	17.0	17.6
• **Payroll as a Percent of Sales**	10.0	9.58
• **Annual Percentage Sales Growth**	4.4	1.7

Table 10.4. Store Characteristics and Performance for Stores Grouped by Competition with Supercenters

	Supercenter Competition	No Supercenter Competition
Number of Stores	51	293
Store Characteristics (Median)		
• **Selling Area**	27,750	28,000
• **Group Size**	12	20
• **Median Household Income**	$34,799	$37,361
Store Performance Levels (Median)		
• **Weekly Sales per Square Foot**	$6.88	$7.60
• **Sales per Labor Hour**	$99.35	$103.15
• **Annual Inventory Turns**	16.5	18.2
• **Payroll as a Percent of Sales**	10.0	9.65
• **Annual Percentage Sales Growth**	0.1	2.1